



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/612,522	07/06/2000	KAZUHIKO SUZUKI	104813	7258

25944 7590 06/09/2003

OLIFF & BERRIDGE, PLC
P.O. BOX 19928
ALEXANDRIA, VA 22320

EXAMINER

HOLMES, MICHAEL B

ART UNIT PAPER NUMBER

2121

DATE MAILED: 06/09/2003

9

Please find below and/or attached an Office communication concerning this application or proceeding.

87

Office Action Summary

Application No.

09/612,522

Applicant(s)

SUZUKI, KAZUHIKO

Examiner

Michael B. Holmes

Art Unit

2121

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 06 July 2000.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-33 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-33 is/are rejected.
- 7) ☒ Claim(s) 6, 11-13, 15-21, 24-27, & 29 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 06 July 2000 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☒ Certified copies of the priority documents have been received in Application No. 09/612,522.
 3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ |
| 2) <input checked="" type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) <u>3,7,8</u> . | 6) <input type="checkbox"/> Other: |



UNITED STATES PATENT AND TRADEMARK OFFICE

COMMISSIONER FOR PATENTS
UNITED STATES PATENT AND TRADEMARK OFFICE
WASHINGTON, D.C. 20231
www.uspto.gov

Examiner's Detailed Office Action

1. This action is responsive to application **09/612,522**, filed **July 06, 2000**.
2. **Claims 1-33** have been examined.

Information Disclosure Statement

3. Examiner acknowledges applicants' submission of prior art and information disclosure. Nevertheless, applicant is respectfully remind of the ongoing Duty to disclose 37 C.F.R. 1.56 all pertinent information and material pertaining to the patentability of applicant's claimed invention, by continuing to submitting in a timely manner PTO-1449, Information Disclosure Statement (IDS) with the filing of applicant's of application or thereafter.

Drawings

4. The formal drawings submitted on **July 06, 2000**, have been reviewed by the USPTO Office of Draftperson's Patent Drawings Review.

Specification

5. The specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is required in correcting any errors of which applicant may become aware in the specification. Appropriate correction is required.

Claim Objections

6. **Claim 6, 11-13, 15-21, 24-27, & 29** are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claim Interpretation

7. Office personnel are to give claims their **"broadest reasonable interpretation"** in light of the supporting disclosure. *In re Morris*, 127 F.3d 1048, 1054-55, 44 USPQ2d 1023, 1027-28 (Fed. Cir. 1997). Limitations appearing in the specification but not recited in the claim are not read into the claim. *In re Prater*, 415 F.2d 1393, 1404-05, 162 USPQ 541, 550-551 (CCPA 1969). See *also *In re Zletz*, 893 F.2d 319, 321-22, 13 USPQ2d 1320, 1322 (Fed. Cir. 1989) ("During patent examination the pending claims must be interpreted as broadly as their terms reasonably allow. . . . The reason is simply that during patent prosecution when claims can be amended, ambiguities should be recognized, scope and breadth of language explored, and clarification imposed. . . . An essential purpose of patent examination is to fashion claims that are precise, clear, correct, and unambiguous. Only in this way can uncertainties of claim scope be

Art Unit: 2121

removed, as much as possible, during the administrative process.”). *see* MPEP § 2106

Claim Rejections - 35 USC § 102

8. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

9. **Claims 1-5, 7-10, 14, 22-23, 28, 30-33** are rejected under 35 U.S.C. 102(e) as being anticipated by **Hugh (USPN 6,031,537)**, Filed: July 14, 1997, Date of Patent: February 29, 2000.

As per Claim 1, Hugh teaches a method of analyzing a thought system of a subject, said subject consisting of at least one individual, comprising the steps of: obtaining a plurality of items perceived by said subject [**Abstract; FIG. 2, (col. 5, line 51 to 67)**]; obtaining relationship information of all possible pairs of said items, based on perception of said subject with respect to rela-

Art Unit: 2121

tionship between two items of each of said all possible pairs of said items [**Abstract; FIG. 2, (col. 5, line 51 to 67)**]; generating a relation matrix of the plurality of items based on said relationship information of each of said items with respect to the all other items [**Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)**]; transforming said relation matrix to a display matrix projected on a representation space having dimensions lower than the number of said items and reflecting a relationship between said items perceived by said subject [**Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)**]; and displaying said items on said representation space according to said display matrix such that said items are plotted on respective positions in said representation space.

[**Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)**]

As per claim 2, a method of analyzing a thought system of a subject wherein said items are represented by language [(**col. 8, line 12 to line 34**)].

As per claim 3, a method of analyzing a thought system wherein said items belong to a single group conceptually undistinguishable [(**col. 8, line 12 to line 34**)].

As per claim 4, a method of analyzing a thought system wherein said step of obtaining items is executed to obtain about items [(**col. 7, line 38 to line 47**)].

As per claim 5, a method of analyzing a thought system wherein said step of obtaining said plurality of items is arranged to obtain successively said items from said subject, while all of said items previously obtained are shown to said subject [(**col. 7, line 26 to col. 8, line 33**)].

As per claim 7, a method of analyzing a thought system of a subject wherein said relationship information consists of rating of relationship between said two items of each of said all possible pairs of said items [(col. 7, line 07 to line 25)].

As per claim 8, a method of analyzing a thought system of a subject wherein said rating of relationship consists of a plurality of rating concepts representing different degrees of said relationship [(col. 7, line 07 to line 38)].

As per claim 9, a method of analyzing a thought system of a subject wherein said plurality of rating concepts comprise "small", "medium" and "large" [(col. 7, line 01 to line 06)].

As per claim 10, a method of analyzing a thought system of a subject further comprising the step of detecting a unique item having no relationship to all other items based on said relationship information, and deleting said unique item from said items so as to regenerate said relation matrix [(col. 16, line 18 to line 35)].

As per claim 14, a method of analyzing a thought system of a subject wherein said step of obtaining said plurality of items and said step of obtaining said relationship information are performed successively by said individuals in a substantially continuous time [(col. 7, line 07 to line 14)].

Art Unit: 2121

As per claim 22, a method of analyzing thoughts of at least one individual wherein said step of transforming said relation matrix to said display matrix further comprises the step of storing a data of said display matrix [(col. 14, line 65 to col. 15, line 14)].

As per claim 23, a method of analyzing a thought system of further comprises the step of performing a cluster analysis using said display matrix, so as to separate said items into groups, the number of said groups being smaller than the total number of said items [(col. 16, line 36 to line 48)].

As per Claim 28, Hugh teaches an analyzing apparatus for analyzing a thought system of a subject, said subject consisting of at least one individual, comprising: a first input device being arranged to input a plurality of items perceived by said subject [Abstract; (col. 4, line 43 to line 55; FIG. 1, (col. 5, line 22 to line 50)]; a second input device being arranged to input a relationship information between two items of each of all possible pairs of said plurality of items, according to perception of said subject with respect to said relation rating [Abstract; (col. 4, line 43 to line 55; FIG. 1, (col. 5, line 22 to line 50)]; a relation matrix generator adapted to generate a relation matrix based on said relationship information of each of said items with respect to the others of said items [Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)]; a display matrix generator adapted to transform said relation matrix into said display matrix projected on a representation space having dimension lower than the number of said items, said representation space reflecting a relationship between said items perceived by said subject [Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)]; and a display device adapted to display said items in said representa-

tion space such that said items are plotted on respective positions in said representation according to said display matrix. **[Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)]**

As per claim 30, an analyzing apparatus according to claim 28, wherein said second input device being arranged to input said relationship information consists of a plurality of terminal units connected to said analyzing apparatus via a telecommunication network, so as to allow said individual to input said relationship information by said terminal unit **[(col. 2, line 19 to line 35)]**.

As per claim 31, an analyzing apparatus wherein said second input device being arranged to input said relationship information consists of a plurality of terminal units connected to said analyzing apparatus via a telecommunication network, so as to allow said individual to input said relationship information by said terminal unit. **Rejected** for the same reasons as claim 28.

As per Claim 31, Hugh teaches a computer program product for analyzing a thought system of a subject by using a plurality of items perceived by said subject, said subject consisting of at least one individual, said computer program comprising: computer code that relates each of said items to all other items, using a rating of relationship on several levels **[FIG. 1, (col. 5, line 22 to line 50); FIG. 24 illustrates an alternative algorithm for searching thoughts that may be implemented in an embodiment of the present invention]**; computer code that generate a relation matrix using said obtained relation ratings **[FIG. 1, (col. 5, line 22 to line 50)]**; computer code that performs a multivariate analysis on said relation matrix so as to transform said relation matrix to a display matrix **[FIG. 1, (col. 5, line 22 to line 50)]**; computer code said display the all items on respective position of a representation space according to said display matrix **[FIG. 1, (col. 5,**

Art Unit: 2121

line 22 to line 50)]; and a computer-readable medium that stores the program codes. **[FIG. 1, (col. 5, line 22 to line 50)]**

As per Claim 32, Hugh teaches a computer program data signal for analyzing a thought system of a subject consisting of at least one individual, said computer program data signal embodied in a telecommunication medium (*interpreted as the transmission and reception of information of any type, including but not limited to data, television pictures, sound, cellular and facsimile devices, using electrical, optical, or magnetic signals, sent over wires, fibers, or wireless communication*) and representing sequences of instructions which, when executed by a processor, cause the processor to perform the steps of: obtaining a plurality of items perceived by said subject **[Abstract; FIG. 2, (col. 5, line 51 to 67)]**; obtaining relationship information of all possible pairs of said items, based on perception of the subject with respect to relationship between two items of each of said all possible pairs of the items **[Abstract; FIG. 2, (col. 5, line 51 to 67)]**; generating a relation matrix of said plurality of items based on said relation information of each of said items with respect to said all other items **[Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)]**; transforming the relation matrix to a display matrix projected on a representation space having dimensions lower than the number of said items and reflecting a relationship between the items perceived by the subject **[Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)]**; and displaying said items on said representation space according to said display matrix such that said items are plotted on respective positions in said representation space. **[Abstract; FIG. 3, (col. 7, line 48 to col. 8, line 11)]**

Art Unit: 2121

As per claim 33, a method of forming an analyzing apparatus for analyzing a thought system of a subject said apparatus including a computer device having a processor, said method comprising a step of: transmitting a computer program data signal readable by said computer device to said computer device via a telecommunication medium so that said computer device functions as said analyzing apparatus as defined in claim 28 [(col. 2, line 19 to line35)].

Conclusion

10. The prior art made of record and (listed of form **PTO-892**) not relied upon is considered pertinent to applicant's disclosure as follows. Applicant or applicant's representative is respectfully reminded that in process of patent prosecution i.e., amending of claims in response to a rejection of claims set forth by the Examiner per Title 35 U.S.C. The patentable novelty must be clearly shown in view of the state of the art disclosed by the references cited and any objections made. Moreover, applicant or applicant's representative must clearly show how the amendments avoid or overcome such references and objections. *See 37 CFR § 1.111(c)*.

Correspondence Information

11. Any inquiries concerning this communication or earlier communications from the examiner should be directed to **Michael B. Holmes** who may be reached via telephone at **(703) 308-6280**. The examiner can normally be reached Monday through Friday between 8:00 a.m. and 5:00 p.m. eastern standard time.

Art Unit: 2121

If you need to send the Examiner, a facsimile transmission regarding After Final issues, please send it to (703) 746-7238. If you need to send an Official facsimile transmission, please send it to (703) 746-7239. If you would like to send a Non-Official (draft) facsimile transmission the fax is (703) 746-7240. If attempts to reach the examiner by telephone are unsuccessful, the Examiner's Supervisor, John Follansbee, may be reached at (703) 305-8498.

Any response to this office action should be mailed too:

Director of Patents and Trademarks Washington, D.C. 20231. Hand-delivered responses should be delivered to the Receptionist, located on the fourth floor of **Crystal Park II, 2121 Crystal Drive Arlington, Virginia.**

Michael B. Holmes

Patent Examiner

Artificial Intelligence

Art Unit 2121

United States Department of Commerce

Patent & Trademark Office



**JOHN FOLLANSBEE
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2100**